

Amendments to the Specification:

Please replace the paragraphs beginning on page 9, line 5 and ending on page 9, line 16 with the following paragraphs:

Document 18 which the viewer of web page 16 would like to retrieve requires application 20 to access the information contained therein. Selection of the link comprised by initial web page 16, leads to secondary web page 22 which invokes client loadable elements 14 which are attached to secondary web page 22 and are now resident on the client. If the client does not already comprise requested application 20, client provision system 10 provides requested application 20 to the client. When application 20 is resident on the client and invoked, document 18 is retrieved.

The provision of an application encompasses both the updating of a version of the application, already extant on the client, to the requested version, ~~of the~~ and the installation of the requested application when an older version is not extant on the client. The provision of an application further encompasses the invoking of the requested application after either updating or installation.

Please replace the paragraphs beginning on page 14, line 7 and ending on page 14, line 17 with the following paragraphs:

The ability of Java applet 420 to access files, on behalf of CGI 410, within operating system 406 of client 402 is not a standard functionality provided for by either a server resident process or operating system 406 of client 402. This access requires that secure browser hosted processes (Java Applet 420 in the current embodiment) and a communication "pipe" 424 within the communication link 422 be established between CGI 410 and operating system 406. Pipe 424 is often in place for communications from CGI 410 to operating system 406 of client 402 but it is seldom in place to facilitate communications from operating system 406 of client 402 to CGI 410. The process for establishing pipe 424 involves interactions between client browser 408 and operating system 406. This process is initiated after the selection of link 427 within initial web page 417 (step 302 of figure 3) and generally occurs at step 303 of figure 3.

Please replace the sentence on page 14, fourth paragraph at line 18 with the following:

In an embodiment where browser 408 is Internet Explorer the method of establishing communications [\[\[link\]\]](#) pipe 424 is illustrated in Figure 5. At step 502 server 404 provides web page 425, containing Secure Java applet 420 to browser 408. At step 504 browser 408 validates the security information associated with digitally signed Java applet 420 by assessing either information provided by the user of client 402 or from the cache of client 402. With the security information validated browser 408 loads Java applet 420 into memory 403 of client 402. Java applet 420 is then invoked. Since web page 425 that is invoked and presented to client 402 is browser specific, the application provision system, is embedded with browser-specific logic to use capabilities provided by the browser. In this embodiment, Internet Explorer runs a specialized version of the Sun Java virtual machine which is embedded in Internet Explorer. Using Microsoft Java extensions Java applet 420 is able to directly access operating system 406 using resources provided through Jdirect, the current browser to operating system gateway mechanisms appropriate for Microsoft operating systems. Other appropriate browser to operating system gateway mechanisms will be apparent to those of skill in the art and are within the scope of the invention. At step 506 the Microsoft Java virtual machine accesses the Microsoft extensions. At step 508 Java applet 420 access resources of operating system 406 through the operating system gateway. Java applet 420 then installs, invokes and reads output from local executable files.

Please replace the sentence on page 15, second paragraph at line 7 with the following:

In another embodiment browser 408 of client 402 is Netscape Navigator. The process for establishing [\[\[link\]\]](#) pipe 424 between operating system 406 of client 402 is presented in Figure 6. The process presented in Figure 6 contains more steps than the process of Figure 5 as Netscape Navigator does not include built in Microsoft extensions to the core Sun Application Protocol Interface (API). At step 602 server 404 provides secondary web page 425 with embedded, digitally signed Java applet 420 to browser 408. Since web page

425 that is invoked and presented by ~~client 402~~ client 402 is browser specific, the application provision system, is embedded with browser-specific logic to use capabilities provided by the browser. At step 604 browser 408 validates the security information contained in Java applet 420 by assessing either information from the user of client 402 or from the cache of client 402. With the security information validated Java applet 420 is loaded into memory 403 of client 402. Java applet 420 is then invoked. At step 606 the standard Sun Java virtual machine determines the nature of local operating system 406. At step 608 the Sun Java virtual machine requests a native executable from originating server 404. Server 404 returns to native executable to the Java virtual machine via stream communications at step 610. This native executable is an operating system specific executable that is capable of determining: a) if an instance of an application 212 is installed on the client system; and b) what version of the application is installed. Java applet 420 then writes the native executable to local non-volatile storage, which in the current embodiment is a hard disk, at step 612. Java applet 420 directly accesses resources of operating system 406 via the Java Native Interface (JNI) through this native executable, at step 614. Once the installation status of the client has been determined Java applet 420 can, as necessary invoke the downloaded executable which can install, invoke and read output form the appropriate local executable.